

**REMARKS**

Claims 1, 2 and 4-11 are pending and under consideration. Claims 1 and 2 are allowed. Claims 4 and 11 are amended as described herein.

Claim 4 is rejected under 35 U.S.C. § 102(a) as being anticipated by GenBank Acc. Nos. A74554 or A77533. Claims 5-11 are rejected under 35 U.S.C. § 103 as being rendered obvious by GenBank Acc. Nos. A74554 or A77533.

For reasons set forth below, Applicants respectfully request that the rejections be removed and the claims be allowed to issue.

**I. The Claims Are Not Anticipated**

Claim 4 is rejected under 35 U.S.C. § 102(a) as being anticipated by GenBank Acc. Nos. A74554 or A77533, which both correspond to Sequence 240 from WO94/01548 and European Patent No. EP0587279, respectively. According to the Examiner, A74554 and A77533 disclose a sequence of 250 bp that can hybridize, with a single mismatch, to SEQ ID NO:1, so that Claim 4 would read on the isolated nucleic acid disclosed in A74554 and A77533.

In response, Applicants herein amend Claim 4 so that is drawn toward nucleic acids that hybridize to "an isolated nucleic acid encoding a polypeptide having growth suppressive activity." Support for this amendment may be found in the specification, *inter alia*, on page 9, lines 18-21, on p. 63, line 25 through p. 64, line 20, p. 70, lines 18-21, and in Figure 9. Applicants assert that Claim 4, as amended herein, is not anticipated by the sequence disclosures of GenBank Acc. Nos. A74554 and A77533, because these sequences encode only an RNA helicase domain and not a CARD domain, which are both present in MDA-5 and both of which may be required for growth-suppressive function. Applicants therefore respectfully request that the Examiner withdraw the rejection of Claim 4 under 35 U.S.C. § 102(a).

## **II. The Claims Are Not Obvious**

Claims 5-11 are rejected under 35 U.S.C. § 103 as being rendered obvious by GenBank Acc. Nos. A74554 or A77533. According to the Examiner, it would have been obvious to one of ordinary skill in the art to make a vector comprising the nucleic acid disclosed in GenBank Acc. Nos. A74554 or A77533 and host cells comprising said vector, wherein the host cell can be a mammalian cell such as a melanocyte, an immortalized cell, or various forms of cancer cells, given the teachings of GenBank Acc. Nos. A74554 or A77533.

In response, Applicants assert that, in light of the amendment of Claim 4 described hereinabove, Claims 5-11 are not rendered obvious by the disclosures of GenBank Acc. Nos. A74554 or A77533, because the nucleic acid comprised within the vector of Claim 5 or the host cell of Claim 6, or the other claims dependent therefrom, must now comprise either the sequence shown in SEQ ID NO:1 encoding a Melanoma Differentiation Associated Gene-5 (Mda-5) polypeptide, the sequence encoding an Mda-5 polypeptide having the sequence of SEQ ID NO:2, or a sequence that encodes an Mda-5 polypeptide having biological activity, wherein this nucleic acid hybridizes to the nucleic acid of SEQ ID NO:1 or its complementary strand. The partial sequences cited are insufficient to disclose or suggest any of the claimed sequences. Applicants therefore respectfully request that the Examiner withdraw the rejection of Claims 5-11 under 35 U.S.C. § 103.

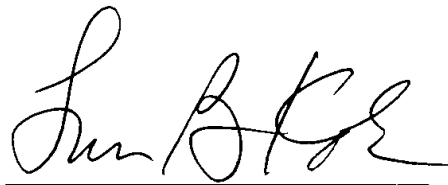
CONCLUSION

Based on the foregoing remarks and in light of the amendments, Applicants submit that the present application is in condition for allowance. A Notice of Allowance is therefore respectfully requested.

Applicants believe a fee of \$55.00 is due with this response for a one-month extension of time as required under 37 C.F.R. §1.17(a)(1) and, accordingly, Applicants enclose a check in the amount of \$55.00. Should any additional fees be required in association with this communication or should any overpayment be made, the Commissioner is hereby authorized to charge an additional fees or credit any overpayments to Deposit Account Number 02-4377. A duplicate copy of this communication is enclosed.

Respectfully submitted,

BAKER BOTTS L.L.P.

A handwritten signature in black ink, appearing to read "Lisa B. Kole", written over a horizontal line.

Lisa B. Kole  
Patent Office Reg. No. 35,225

Attorney for Applicants

30 Rockefeller Plaza  
New York NY 10112-4498

(212) 408-2628

Enclosures